

- 1: image output device
- 2: image supply device
- 11: communicator
- communication controller
- output mechanism output controller
 - control panel
 - display <u>16</u>
- 17: power supply
- 21: communicator
- communication controller
 - central controller
 - storage medium
- control panel
- display 27: battery
- 31: image data file

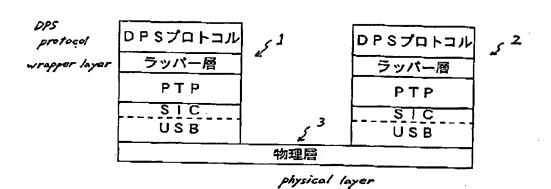
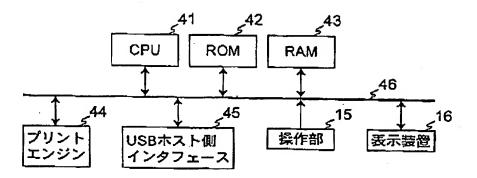


Fig. 2

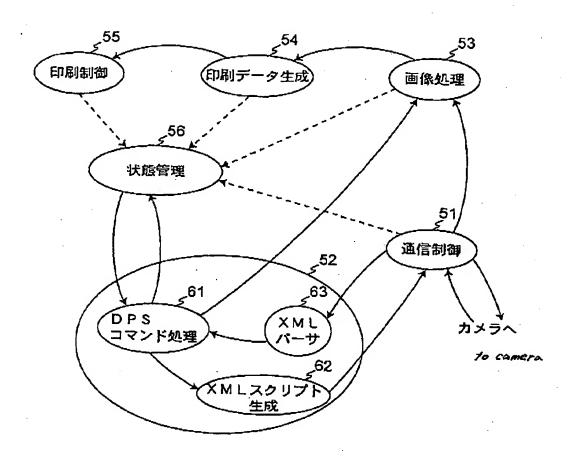


15: control panel

16: display

44: print engine

45: USB host interface



51: communication control

52: DPS protocol processing

53: image processing

54: image data generation

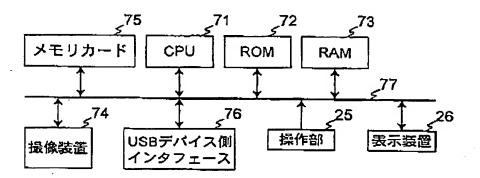
55: print control

56: status management

61: DPS command processing

62: XML script generation

63: XML parser



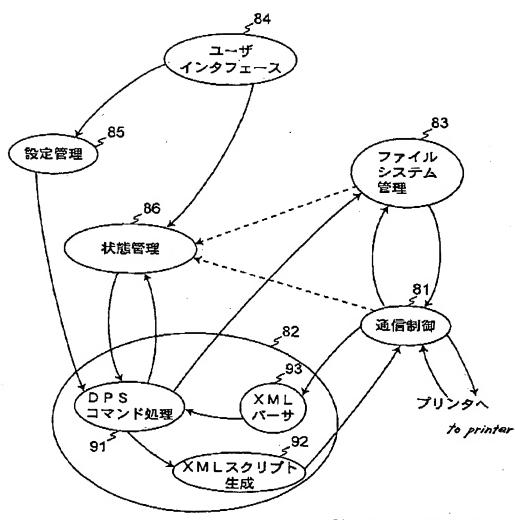
25: control panel

26: display

74: imaging device

75: memory card

76: USB device interface



communication control

82: DPS protocol processing

83: file system management

84: user interface

85: setting management

86: status management

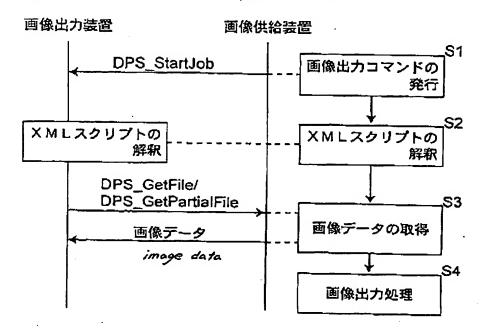
91: DPS command processing

92: XML script generation

93: XML parser

image output device 1

image supply device 2



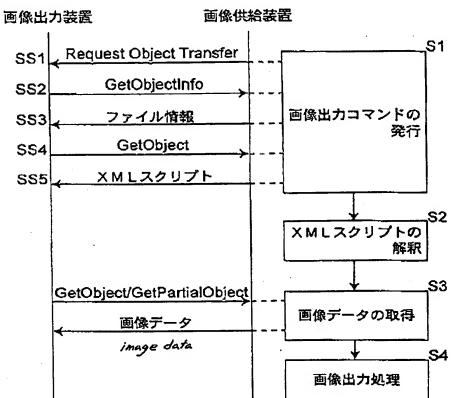
S1: transmit image output command

S2: interpret XML scriptS3: acquire image data

S4: image output processing



image supply device 2



S1: transmit image output command

S2: interpret XML scriptS3: acquire image data

S4: image output processing

SS3: file information SS5: XML script

```
<?xml version="1.0"?>
<dps xmlns="http://www.xxxx">
<startJobRequest>
  <job>
   <jobConfig>
    <quality>01000000</quality>
    <paperSize>02010000</paperSize>
    <paperType>03020000</paperType>
    <fileType>04150000</fileType>
    <date>05010000</date>
    <fileName>06000000</fileName>
    <imageOptimize>07000000</imageOptimize>
    <layoutitem>08010000</layoutitem>
   </jobConfig>
   rintlnfo>
    <image>
     <imageID>00000001</imageID>
     <imageDate>2002/05/30</imageDate>
    </image>
   </iob>
 </startJobRequest>
</dps>
```

```
<?xml version="1.0"?>
<dps xmlns="http://www.xxxx">
  <getFileRequest>
    <fileID>00000001</fileID>
    <buffPtr>0010000</buffPtr>
  </getFileRequest>
  </dps>
```

DPSプロトコル・ DPS protocol ラッパー層 ラッパー層 ラッパー層 wrapper layer S C S | (ファイルシステム) PTP ファイルシステム (file system) file system マスストレーシ クラス SIC TCP/IP mass storage class wireless LAN USB U \$ B 無線 LAN 物理層 物理層 物理層 physical layer 物理層 物理層 物理層 physical layer USB USB 無線 LAN マスストレージ クラス wireless LAN ŝīc̄ TCP/IP mass storage class S C S I (ファイルシステム) PTP ファイルシステム (file system) file system ラッパー層 ラッパー層 ラッパー層 wropper layer DPSプロトコル DPS protocol

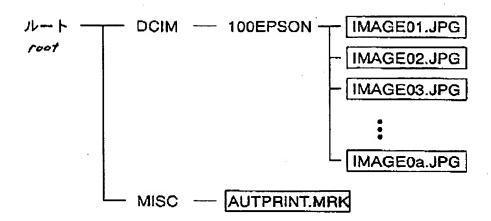
Tプリケーション
DPS layer

DPS layer

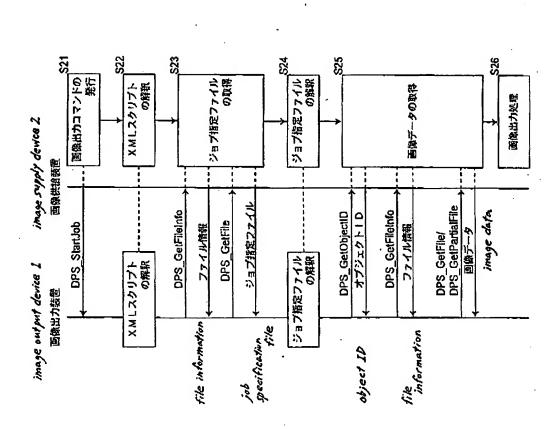
DPS | SIC SIC USB 物理層

physical layer

Fig. 12



```
[JOB]
PRT PID = 001
PRT TYP = STD
PRT QTY = 002
IMG SRC = "./DCIM/100EPSON/IMAGE01.JPG"
IMG FMT = EXIF2-J
[JOB]
PRT PID = 002
PRT TYP = $TD
PRT QTY = 001
IMG SRC = "./DCIM/100EPSON/IMAGE02.JPG"
IMG FMT = EXIF2-J
[JOB]
PRT PID = 003
PRT TYP = STD
PRT QTY = 001
IMG SRC = "./DCIM/100EPSON/IMAGE03.JPG"
IMG FMT = EXIF2-J
```



\$21: transmit image output command

S22: interpret XML script

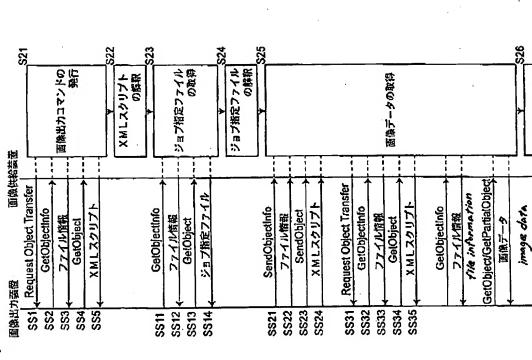
acquire job specification file **S23**:

interpret job specification file S25: acquire image data

S24:

image output processing **S**26:

image output device 1 Image supply device 2



S21: transmit image output command

interpret XML script

3: acquire job specification file

4: interpret Job specification file

5: acquire image data

S26: image output processing

SS3: file information

SS5: XML script

SS12: file information

SS14: job specification file

SS22: file information

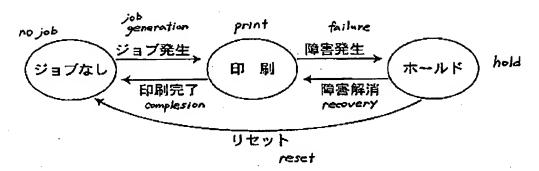
SS24: XML script

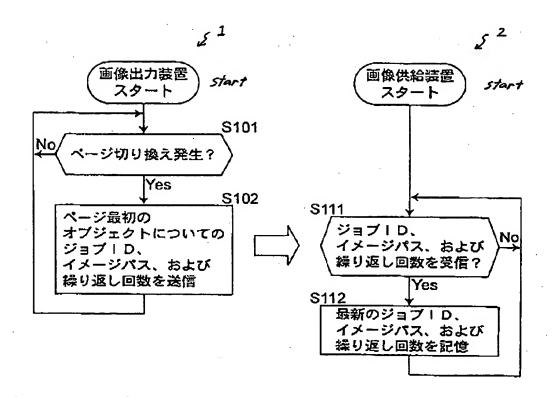
SS33: file information

SS35: XML script

国农出力处理

Fig. 18



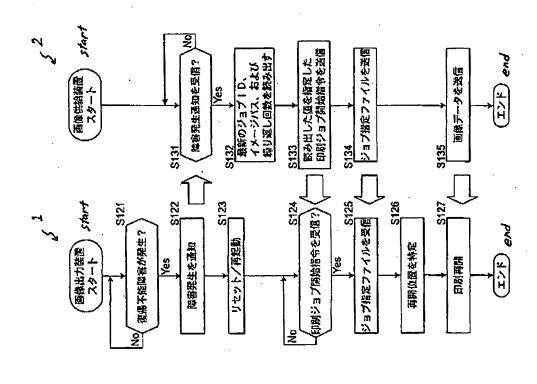


S101: page break is detected?

S102: transmit resumption information of new page

S111: resumption information is received?

S112: update resumption information with received one



S121: self-unrecoverable failure is occurred?

S122: notify failure occurrence

S123: reset/reboot

S124: print job start command is received?

S125: receive job specification file

S126: specify resumed position

S127: resume printing

\$131: failure notification is received?

S132: read latest resumption information

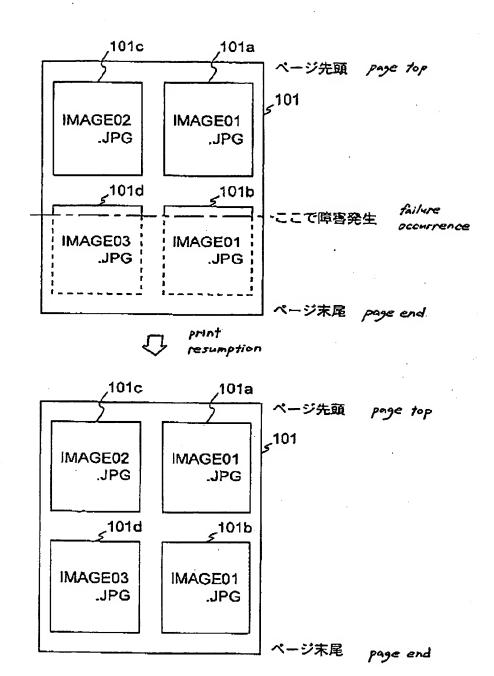
\$133: transmit print job start command for specifying read value

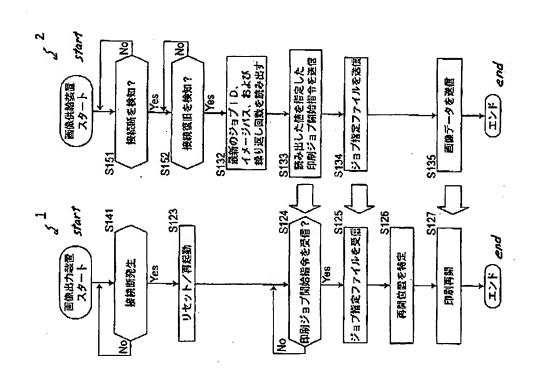
\$134: transmit job specification file

S135: transmit image data

```
<?xml version="1.0"?>
<dps xmlns="http://www.xxxx">
  <notifyDeviceStatusRequest>
    <errorStatus>0E010000</errorStatus>
    <reason>0F010000</reason>
    <disconnectEnable>10010000</disconnectEnable>
    <capabilityChange>14010000</capabilityChange>
    </notifyDeviceStatusRequest>
</dps>
```

```
<?xml version="1.0"?>
<dps xmlns="http://www.xxxx">
 <startJobRequest>
  <job>
   <jobConfig>
    <quality>01000000</quality>
    <paperSize>02010000</paperSize>
    <paperType>03020000
    <fileType>04150000</fileType>
    <date>05010000</date>
    <fileName>06000000</fileName>
    <imageOptimize>07000000</imageOptimize>
    <layoutitem>08010000</layoutitem>
   </jobConfig>
   continto>
    <image>
     <imageID>0000002</imageID>
     <imageDate>2002/05/30</imageDate>
     <prtPid>001</prtPid>
     <imagePath>..\DCIM\100EPSON\IMAGE.JPG</imagePath>
     <copies>002</copies>
    </image>
   </printlnfo>
  </job>
 </startJobRequest>
</dps>
```





S141: disconnection is occurred?

S123: reset/reboot

S124: print job start command is received?

S125: receive job specification file

S126: specify resumed position

S127: resume printing

S151: disconnection is detected?

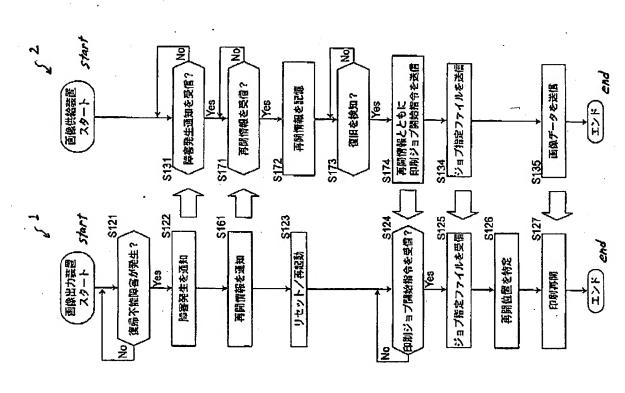
S152: connection recovery is detected?

S132: read latest resumption information

S133: transmit print job start command for specifying read value

S134: transmit job specification file

S135: transmit image data



self-unrecoverable failure is occurred?

notify failure occurrence S122:

notify resumption information S161:

reset/reboot S123;

print job start command is received? S124:

receive job specification file S125:

specify resumed position \$126:

resume printing \$127:

fallure notification is received? \$131:

resumption information is received? S171:

store received resumption information \$172:

recovery is detected? \$173:

transmit print job start command with resumption information S174:

read latest resumption information S132:

transmit print job start command for specifying read value S133:

transmit job specification file S134:

fransmit image data S135:

